

DOCUMENT RESUME

ED 147 065

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RC 010 188

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TITLE An Evaluation of Education for Indians. Robeson County, North Carolina 1975-1976.
INSTITUTION Robeson County Board of Education, Lumberton, N.C.
SPONS AGENCY Office of Education (DHEW), Washington, D.C. Office of Indian Education.
PUB DATE 76
NOTE 24p.; For related document, see RC 010 187
EDRS PRICE MF-\$0.83 HC-\$1.67 Plus Postage.
DESCRIPTORS *Academic Achievement; *American Indians; *Elementary Secondary Education; *Federal Programs; Grade 3; Grade 10; Mathematics; *Program Evaluation; Reading
IDENTIFIERS *Comprehensive Tests of Basic Skills; *Lumbees; North Carolina (Robeson County)

ABSTRACT

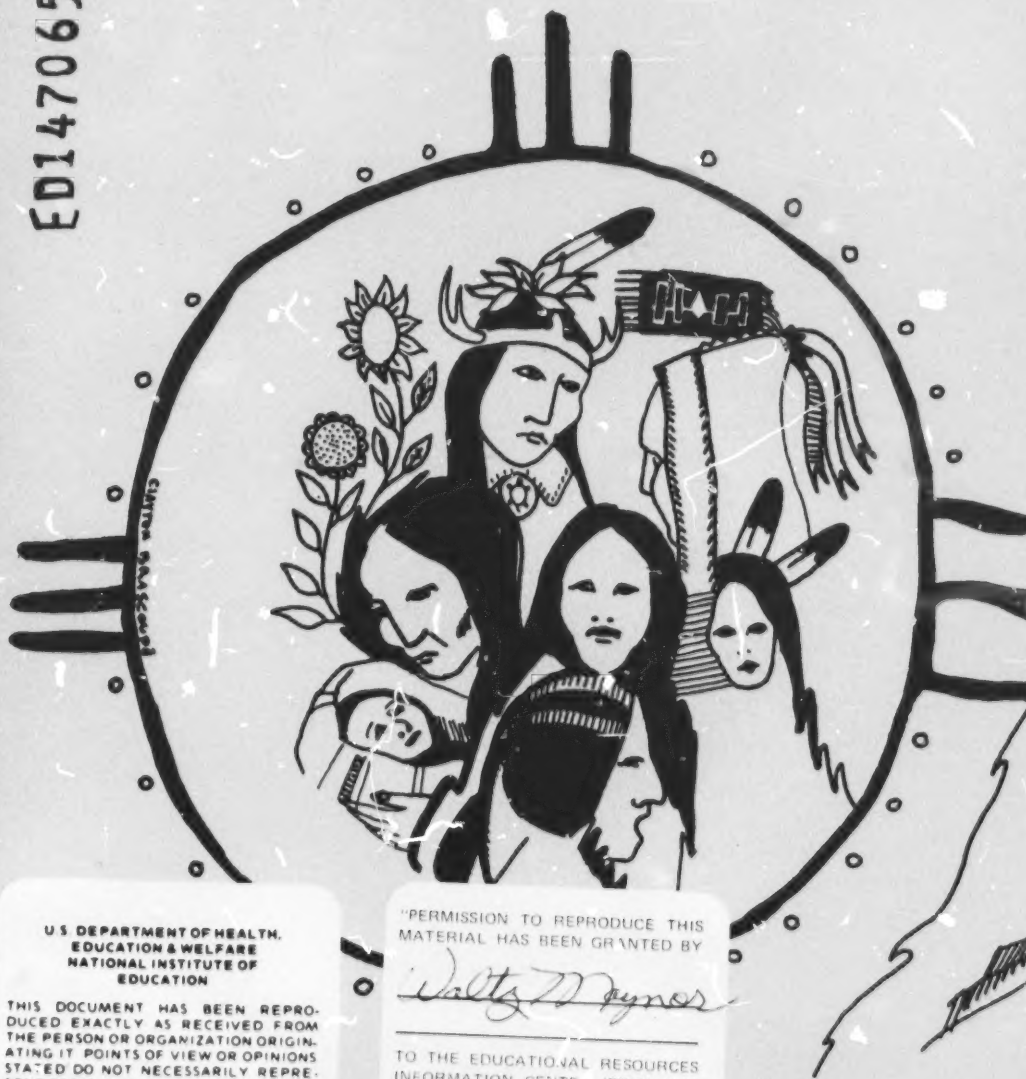
Results of the academic achievement of American Indian students in the Robeson County, North Carolina School Administrative Unit are presented in this document. As part of an evaluation of an educational program funded under the Indian Elementary and Secondary School Assistance Act, this document reflects program impact upon the county, its Lumbee Indian students (60% of the total public school enrollment), and its 25 schools. Systemwide mean scores earned by third and tenth grade students on the Comprehensive Test of Basic Skills are presented for 1973, 1974, 1975, and 1976; additionally, graphic figures are presented for each of the Basic Skills' subtests (reading vocabulary, reading comprehension, reading total, language mechanics, language experience, language spelling, language total, arithmetic comprehension, arithmetic concepts, arithmetic application, arithmetic total, and battery total). Both the scores and graphs presented here indicate a continuous achievement growth trend for third and tenth grade students in Robeson County. (JC)

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FOR INDIANS

ROBESON COUNTY
NORTH CAROLINA

1975-1976

WALTZ MAYNOR
NORTH CAROLINA
CENTRAL

RC010188

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HISTORICAL BACKGROUND

The Robeson County School Administrative Unit operates in an area with a large concentration of Lumbee Indians and in an area of continuous Indian population growth. The 1970 census lists the County's Indian population as 26,000. This is the largest Indian population east of the Mississippi River. The importance of agriculture to the County's economy, the conservative growth of industry, and the determinedness of the Lumbee Indians to maintain their identity and to survive culturally have combined to locate Robeson's three ethnic groups--Indians, Whites, and Blacks--in specific sections of the County. The County's geographic racial composition is reflected in its various school administrative units. Most of the Lumbee Indians are concentrated in rural areas and in the town of Pembroke and attend school within the Robeson County School Administrative Unit.

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FOREWORD

Project Evaluation - Part A - Indian Education Act

Robeson County Schools

Any successful educational program must be: FIRST, planned on the basis of needs assessment; SECOND, implemented in accordance with the adopted plan; THIRD, objectively evaluated for the purpose of replanning. This has been the purpose of this evaluation, in addition to meeting Government requirements in carrying out a program under the Indian Education Act, Part A, by the Robeson County Board of Education.

The program evaluated is now being carried on in 25 separate schools and is designed especially to meet the needs of Indian children in each school community involved.

For the purpose of obtaining an objective and realistic project evaluation, the Indian Parents Committee and the School Administration have arranged for a consultant to design and conduct this project evaluation. This person is not an employee of this school system, nor is he employed within this county. He is a native of this area; he is an Indian who comes from a family of educators; he attended as a student and served as a teacher in the Robeson County School System. Now, he is employed outside of Robeson County, working with other races and cultures, as well as with Indian people, in the field of public education.

Dr. Waltz Maynor is Assistant Dean of North Carolina Central University, Durham, North Carolina. He has been actively involved in education evaluation and research in his present position, as well as in previous employment at Appalachian State University. He holds a B.S. degree from Pembroke State University and a Doctor of Education degree from Duke University, specializing

in Educational Research.

Other than this Foreword, this entire evaluation report was prepared by the above mentioned evaluator. We believe this report speaks for itself and commend it for study by all interested citizens. This project is open for changes and improvements as the need might be determined; therefore, we welcome comments and input from all citizens. We trust this evaluation gives us direction for future planning and implementation.

Y. H. Allen, Superintendent
Robeson County Schools

INTRODUCTION

For the past few years much publicity has been given to the decline in student achievement scores nationwide. Several journal publications have printed speculations on the reasons for this decline; others have recorded statements of its reality. William H. Angoff, Executive Director of College Board Programs, reported in the March, 1975, issue of the English Journal that this trend of declining achievement scores and more specifically SAT scores is indeed a reality. Another discussion of this decline appears in the February, 1976, issue of English Journal. An interesting study by Jerome Kagan a Harvard psychologist, revealed that children who have such poor achievement records "lack experimental variety - the very thing deemed essential for cognitive growth". Kagan's observations are recorded in the Carnegie Quarterly, Summer, 1975. This concern is evident also in The College Board News, June, 1976, in an article titled, "Questions you asked about testing and admissions." The implications of the declining achievement scores are given and some future directions are suggested. The most serious step in understanding this decrease has been the appointment of a special advisory panel by ETS to assess various explanations for the decline in average scores achieved by students who take these tests. Needless to say, the score decline which has occurred over a 12-year period has been the source of concern for the nation's educators, parents, and students.

In spite of these revelations nationally, the Robeson County Schools show not a decline in achievement but an increase in the achievement of its students since 1973. It was in 1972 when Congress passed the Indian Elementary and Secondary School Assistance Act. The purpose of the act

is to increase the educational opportunities of Indian children by developing and carrying out elementary and secondary school programs especially designed to meet the special educational needs of Indian children. The program designed for Robeson County has shown positive results in the academic achievement of students.

EVALUATION DESIGN

The desired outcome of the Indian Elementary and Secondary School Assistance Act is to improve the educational opportunities of Indian children. If the Robeson County program is successful in meeting its objectives, not only will the achievement of current students be increased but the future achievement of students will be greater than the past achievement has been. In short, achievement will increase by grade over time. This fact suggests that a time-series analysis be employed to determine whether or not monies spent in Robeson County to improve the educational opportunities for Indian children are having a positive effect on their achievement.

A time-series is a set of observations taken at specified times, usually at equal intervals. By considering test results on a standardized test across time we are able to evaluate program effects without being misled by fluctuations in achievement due to short term effects. Using this technique to evaluate the program, implementers are free to make certain strategy changes. In short, we will examine the total program's effect and not the effect of a specific strategy.

Indians are enrolled in every school within Robeson County and they comprise more than 60% of the public school enrollment. Realizing this fact, the project will be evaluated by considering the achievement scores for all 3rd and 10th grade students in the county school system. In short, the Indians are of such a majority in the county that any change in the overall achievement for the county reflects a change in the achievement of Indian children. The mean scores earned by 3rd and 10th grade students, system-wide, on the Comprehensive Test of Basic Skills will be analyzed.

DATA ANALYSIS

The Comprehensive Test of Basic Skills has been given to all third and tenth grade students in Robeson County. The actual grade placement at time of testing was 3.6 and 10.6. Test results were obtained and analyzed for 1973, 1974, 1975 and 1976. The statistical results are shown in Tables 1 and 2. The data is presented graphically in Figures 1-12. Both show a continuous achievement growth trend for third and tenth grade students in Robeson County.

TABLE 1

COMPREHENSIVE TEST OF BASIC SKILLS' MEAN GRADE PLACEMENT SCORE
BY SUBTEST FOR ROBESON COUNTY SCHOOL SYSTEM
GRADE 3. YEARS OF TESTING 73, 74, 75 and 76

SUBTEST	MEAN GRADE PLACEMENT SCORE			
	1973	1974	1975	1976
READING VOCABULARY	2.7	2.8	2.9	3.0
READING COMPREHENSION	2.9	2.9	3.0	3.1
READING TOTAL	2.8	2.8	2.9	3.0
LANGUAGE MECHANICS	3.2	3.0	3.0	3.2
LANGUAGE EXPERIENCE	2.8	2.8	2.8	3.0
LANGUAGE SPELLING	3.4	3.2	3.4	3.6
LANGUAGE TOTAL	3.1	2.9	3.0	3.2
ARITHMETIC COMPREHENSION	3.2	3.2	3.2	3.3
ARITHMETIC CONCEPTS	2.9	2.9	2.9	3.0
ARITHMETIC APPLICATION	2.8	2.8	2.8	3.0
ARITHMETIC TOTAL	3.0	3.1	3.1	3.2
BATTERY TOTAL	2.9	2.9	2.9	3.1

TABLE 2

COMPREHENSIVE TEST OF BASIC SKILLS' MEAN GRADE
 PLACEMENT SCORE BY SUBTEST FOR ROBESON COUNTY
 SCHOOL SYSTEM GRADE 10. YEARS OF
 TESTING 73, 74, 75 and 76

SUBTEST	MEAN GRADE PLACEMENT SCORE			
	1973	1974	1975	1976
READING VOCABULARY	7.2	7.4	7.2	7.6
READING COMPREHENSION	7.2	7.3	7.3	7.4
READING TOTAL	7.2	7.3	7.3	7.5
LANGUAGE MECHANICS	7.7	7.6	7.6	7.7
LANGUAGE EXPERIENCE	6.7	6.6	6.6	6.7
LANGUAGE SPELLING	8.4	8.7	8.9	8.7
LANGUAGE TOTAL	7.5	7.6	7.7	7.7
ARITHMETIC COMPREHENSION	7.0	7.2	7.3	7.5
ARITHMETIC CONCEPTS	7.5	7.5	7.6	8.0
ARITHMETIC APPLICATION	7.3	7.3	7.4	7.4
ARITHMETIC TOTAL	7.1	7.2	7.3	7.4
BATTERY TOTAL	7.1	7.2	7.2	7.3

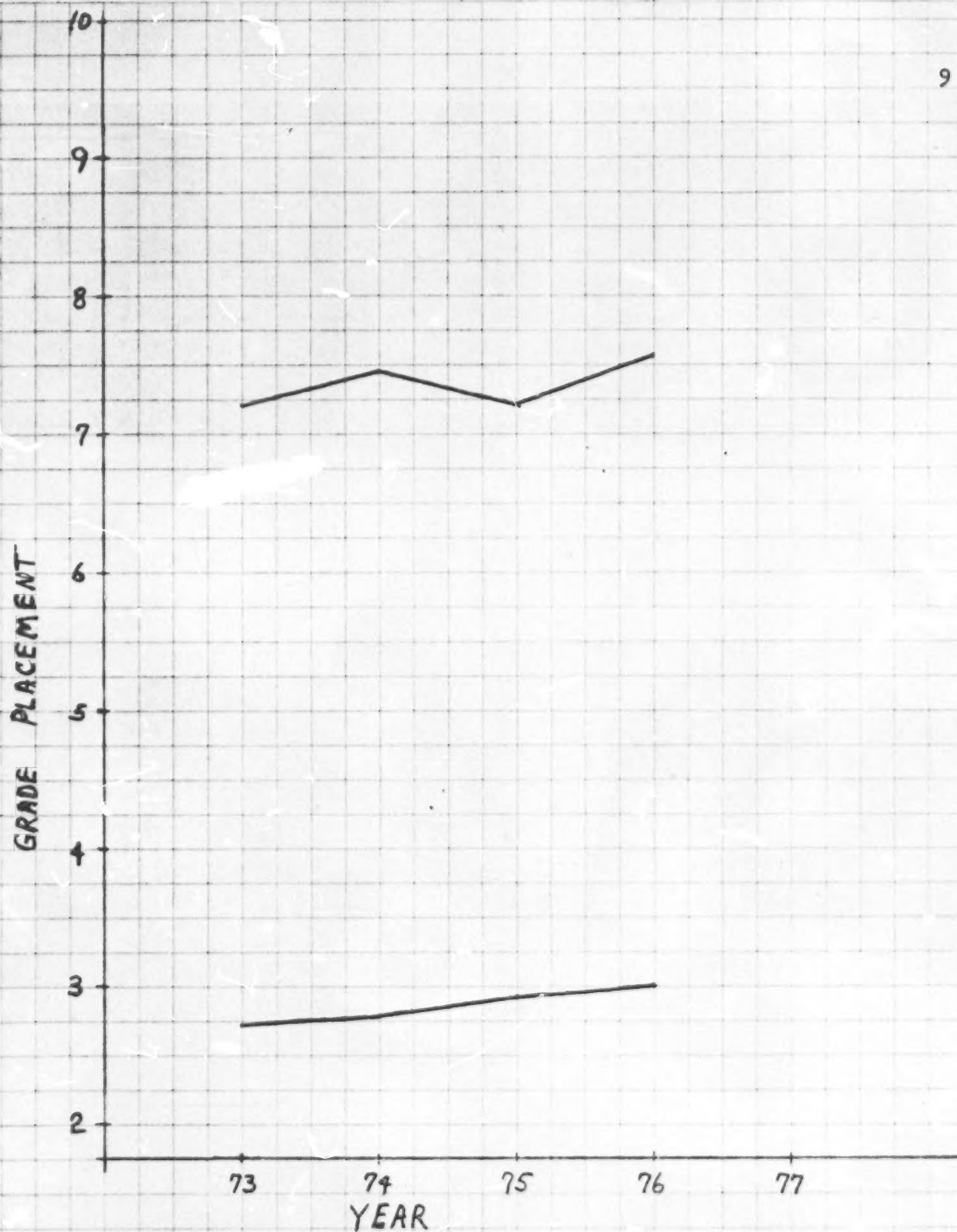


FIGURE 1

MEAN GRADE PLACEMENT SCORES FOR
READING VOCABULARY BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

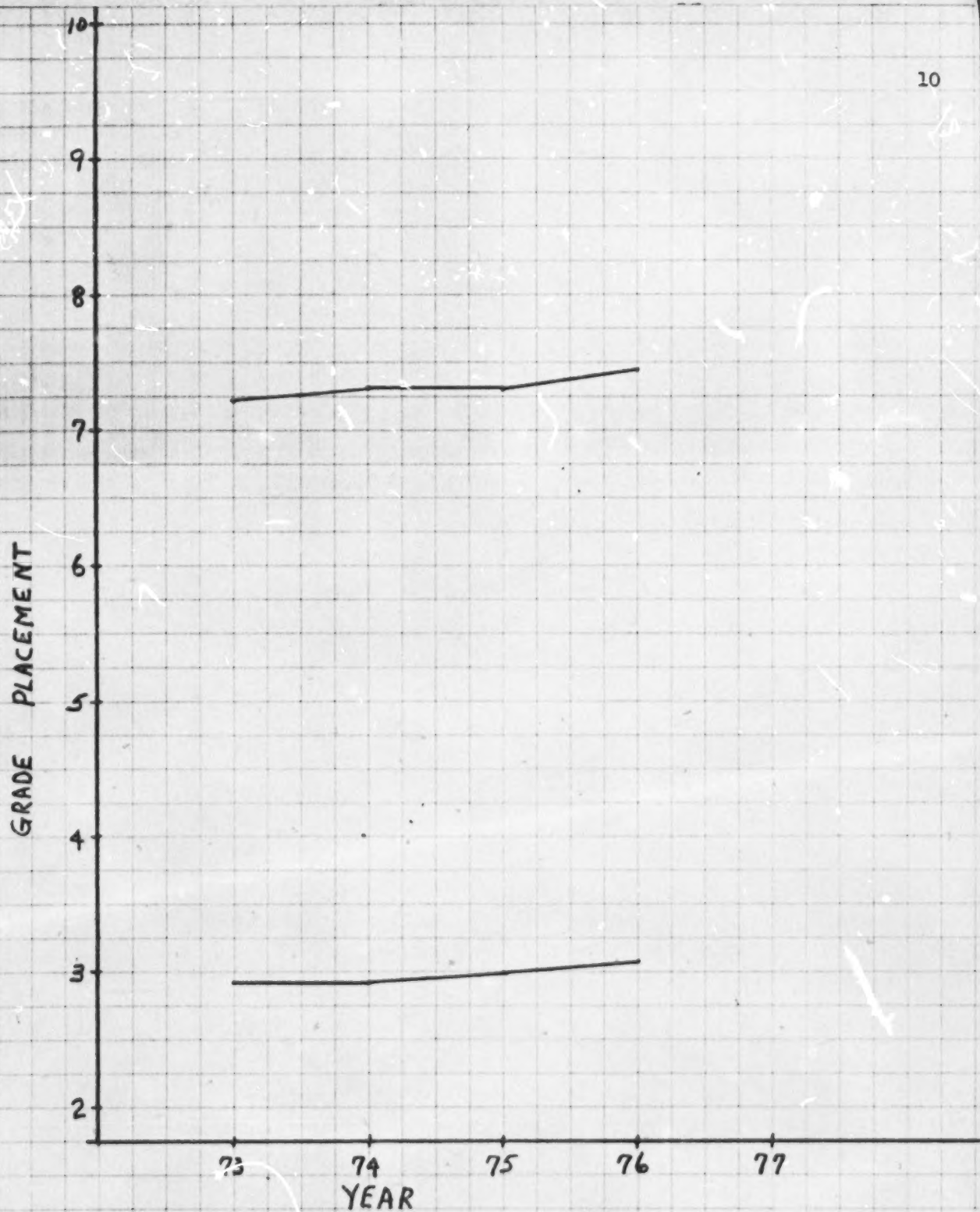


FIGURE 2

MEAN GRADE PLACEMENT SCORES FOR
READING COMPREHENSION BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

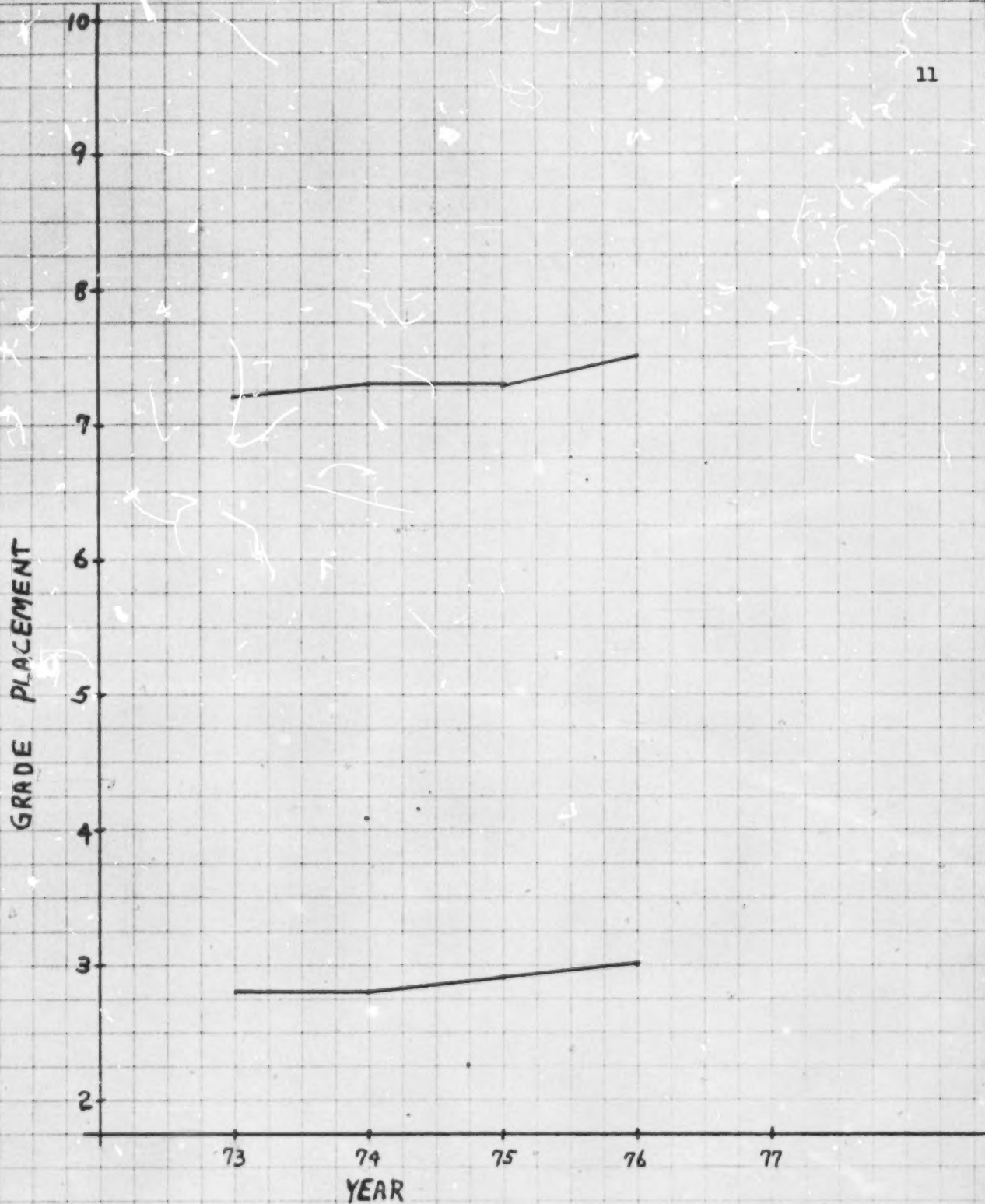


FIGURE 3
MEAN GRADE PLACEMENT SCORES FOR
READING TOTAL BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

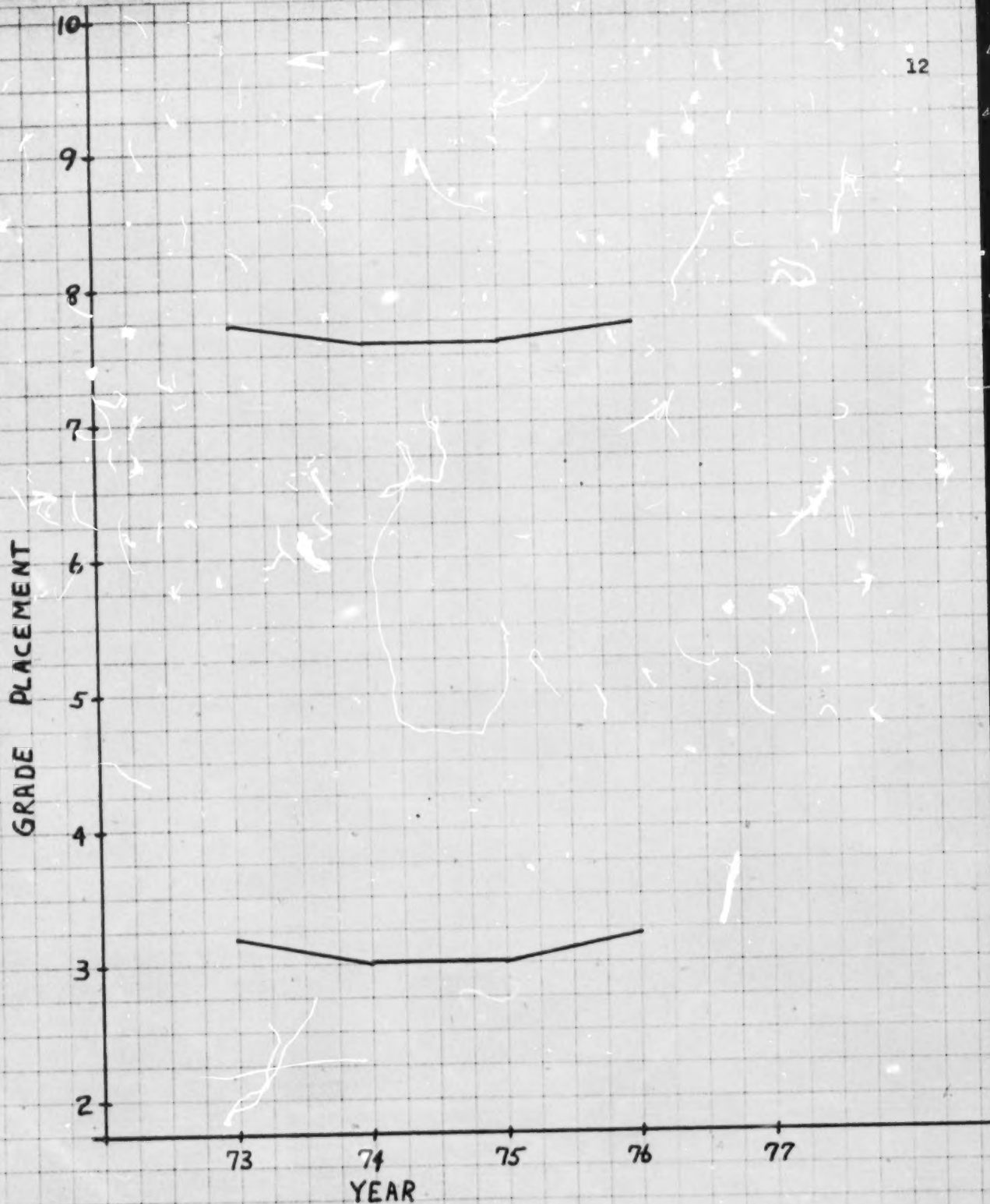


FIGURE 4

MEAN GRADE PLACEMENT SCORES FOR
LANGUAGE MECHANICS BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

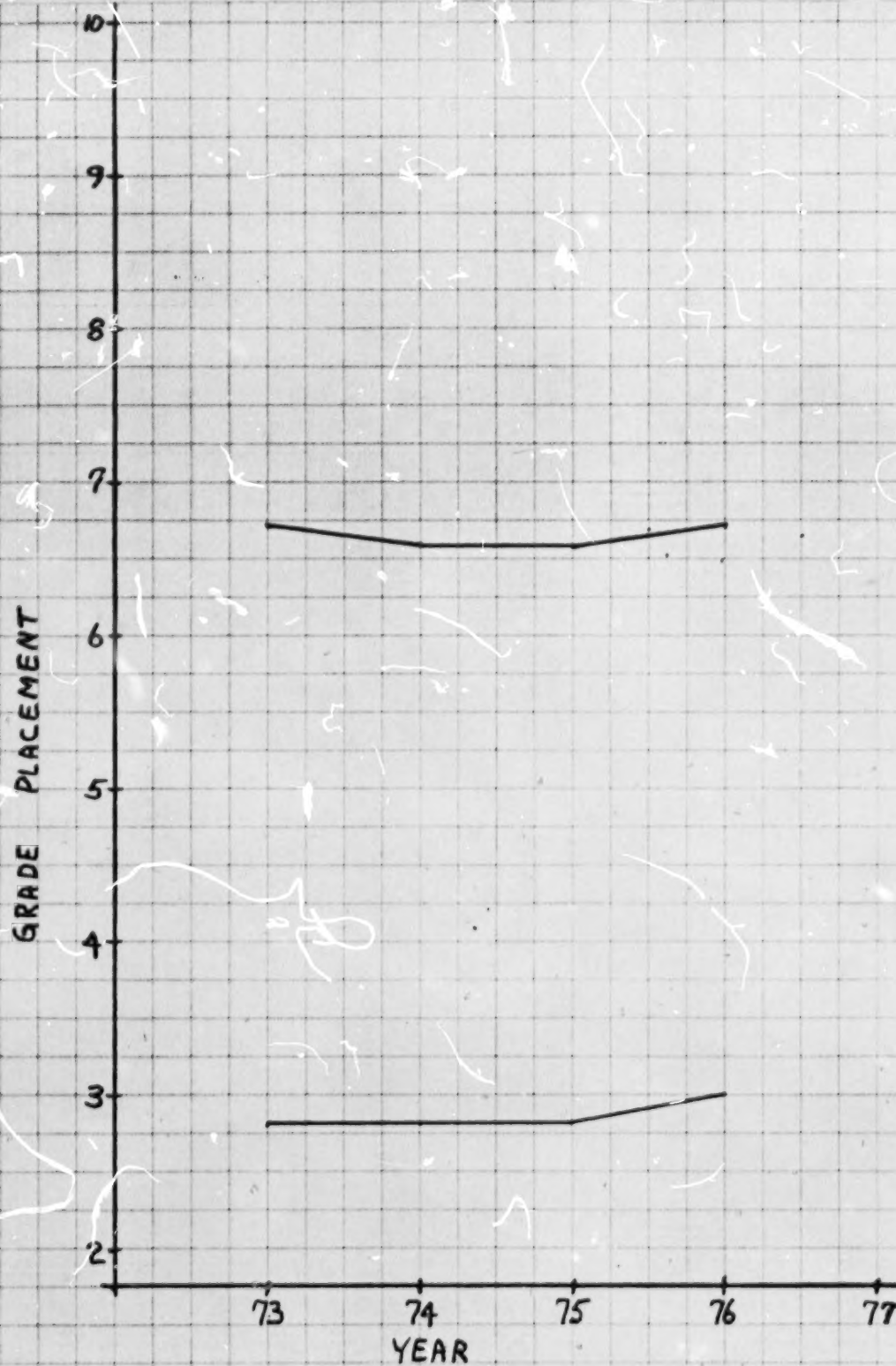


FIGURE 5

MEAN GRADE PLACEMENT SCORES FOR
LANGUAGE EXPERIENCE BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

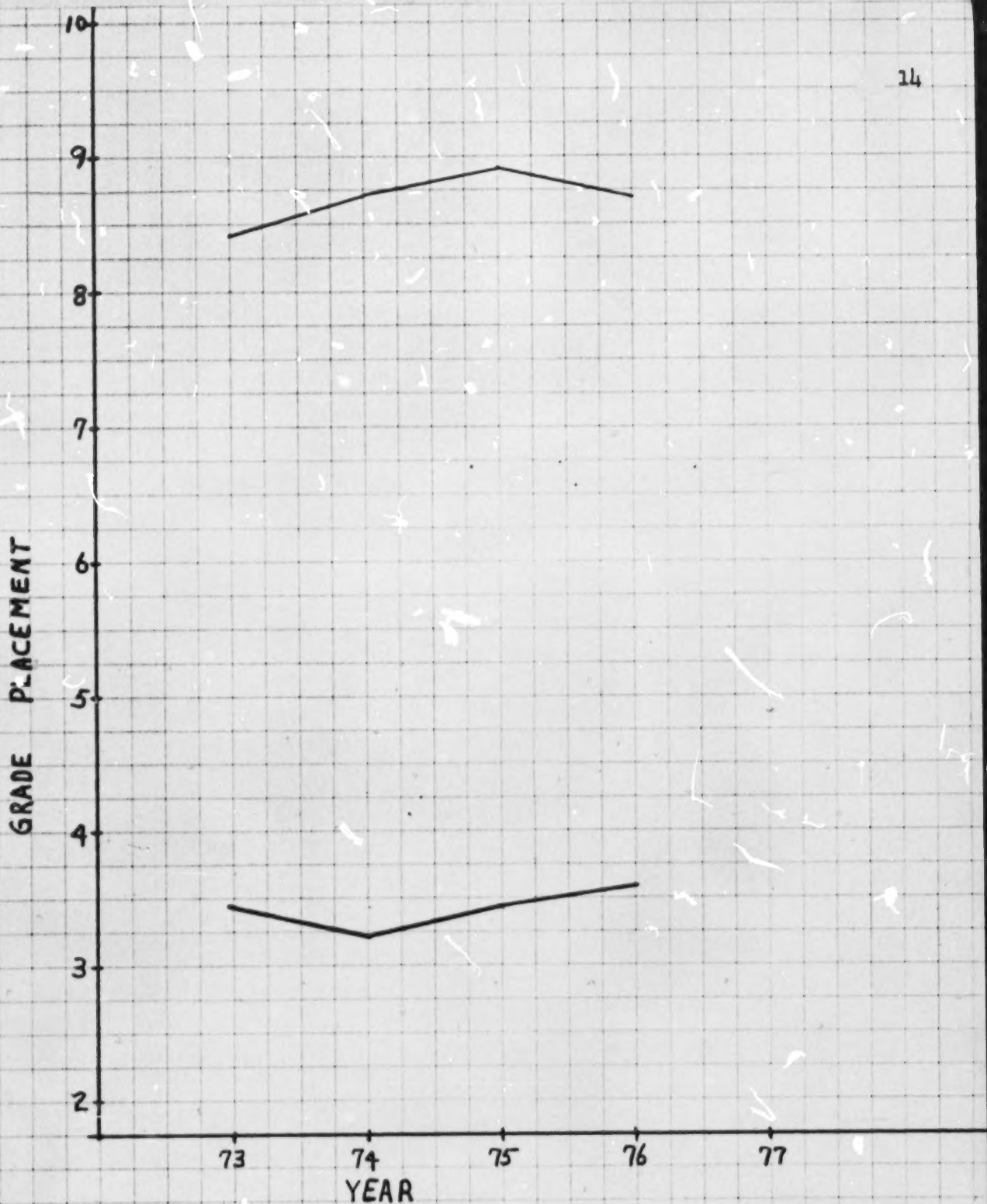


FIGURE 6
MEAN GRADE PLACEMENT SCORES FOR
LANGUAGE SPELLING BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

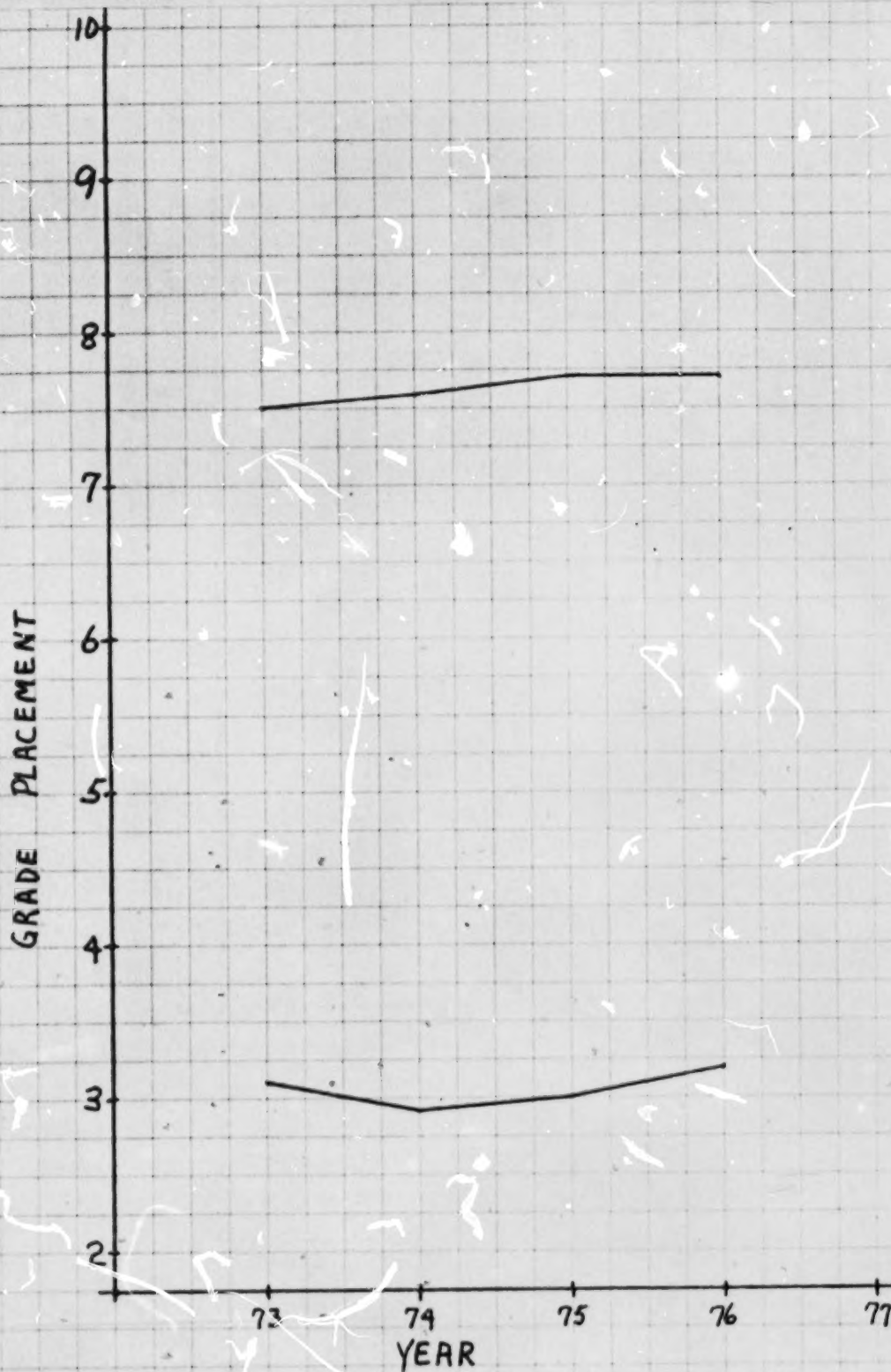


FIGURE 7

MEAN GRADE PLACEMENT SCORES FOR
LANGUAGE TOTAL BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

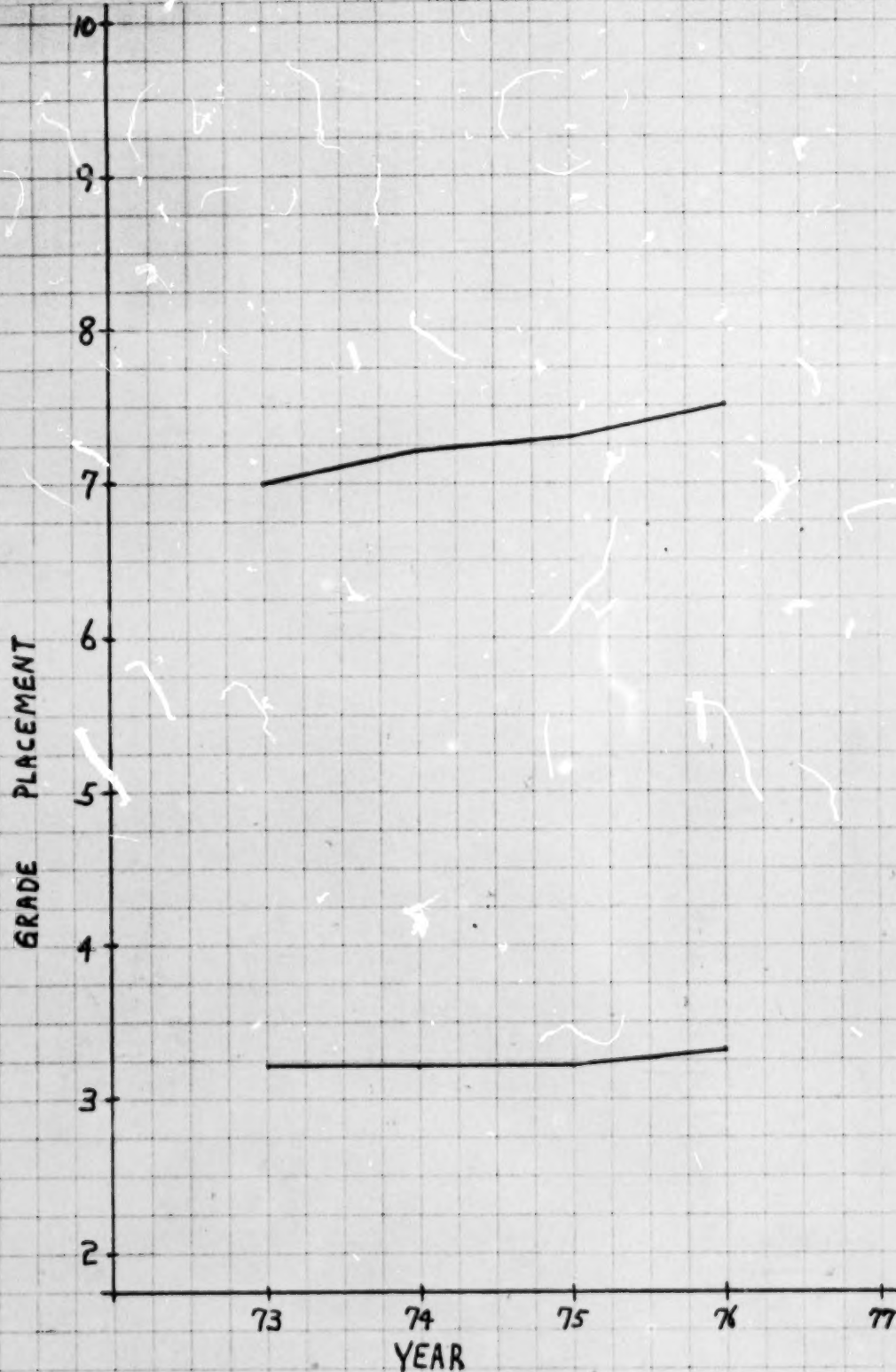


FIGURE 8

MEAN GRADE PLACEMENT SCORES FOR
ARITH. COMPREHENSION BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

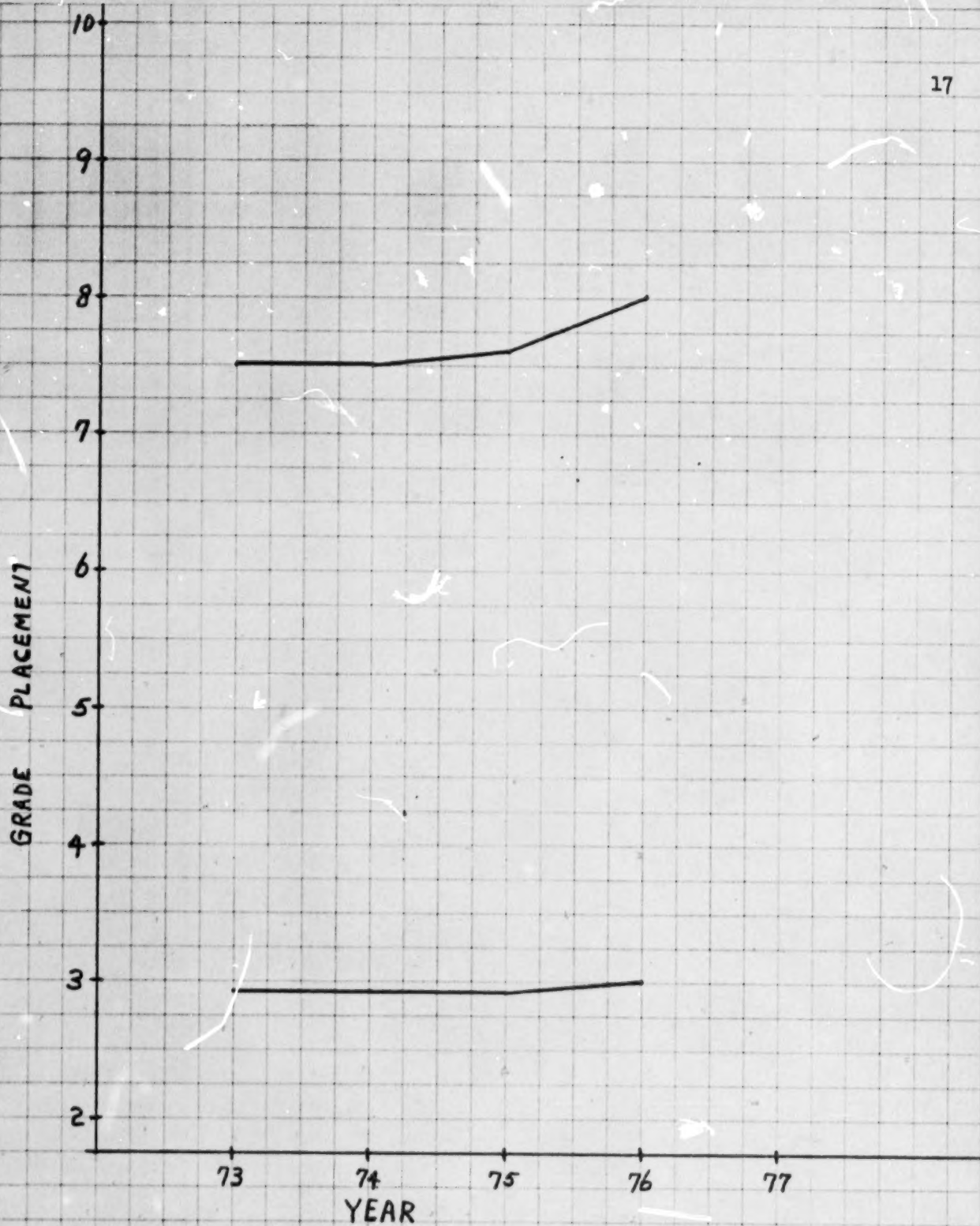


FIGURE 9

MEAN GRADE PLACEMENT SCORES FOR
 ARITH. CONCEPTS BY YEAR OF TESTING. PLOTTED
 SEPARATELY FOR GRADES 3 AND 10.

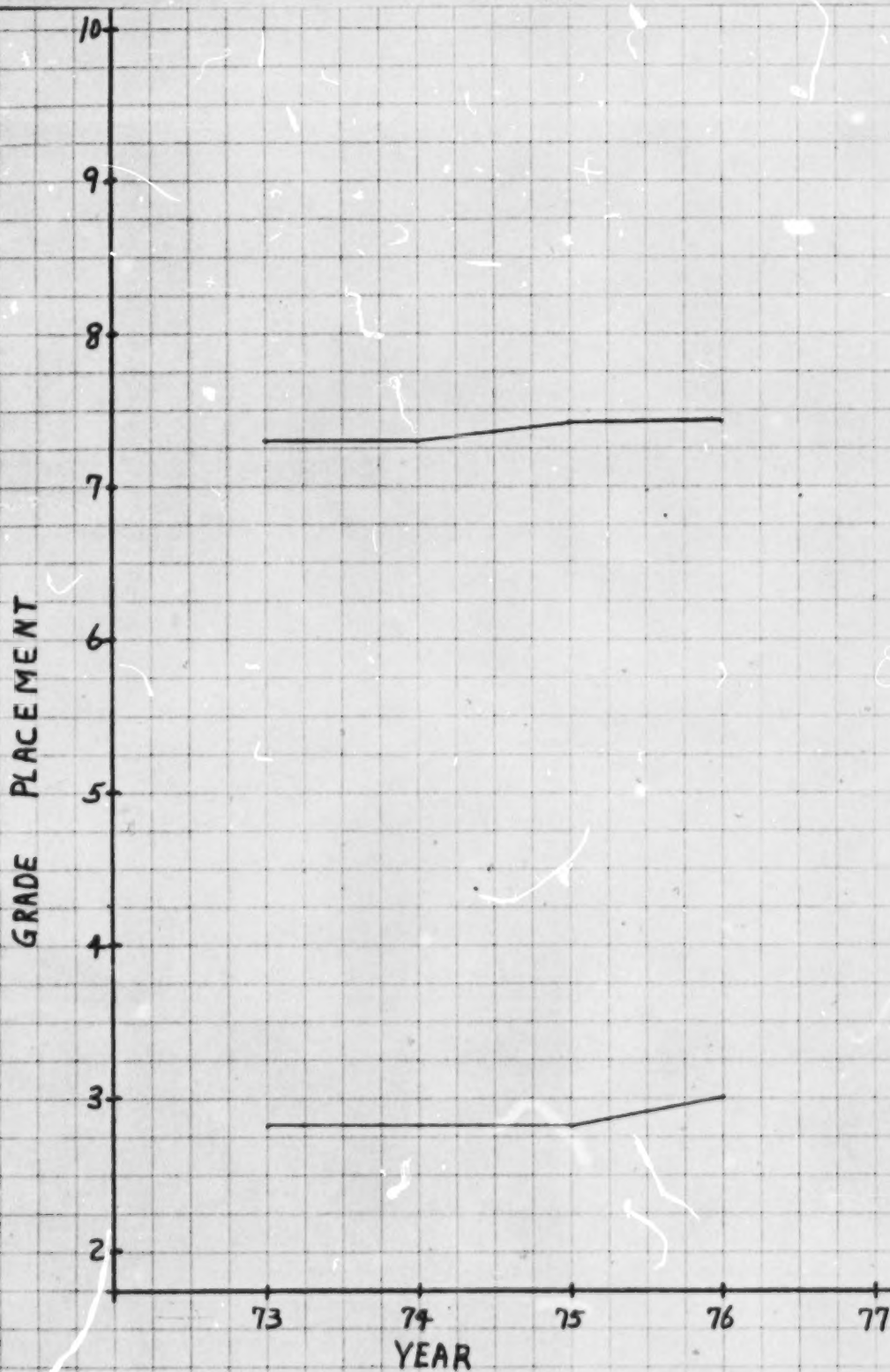


FIGURE 10

MEAN GRADE PLACEMENT SCORES FOR
ARITH. APPLICATION BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

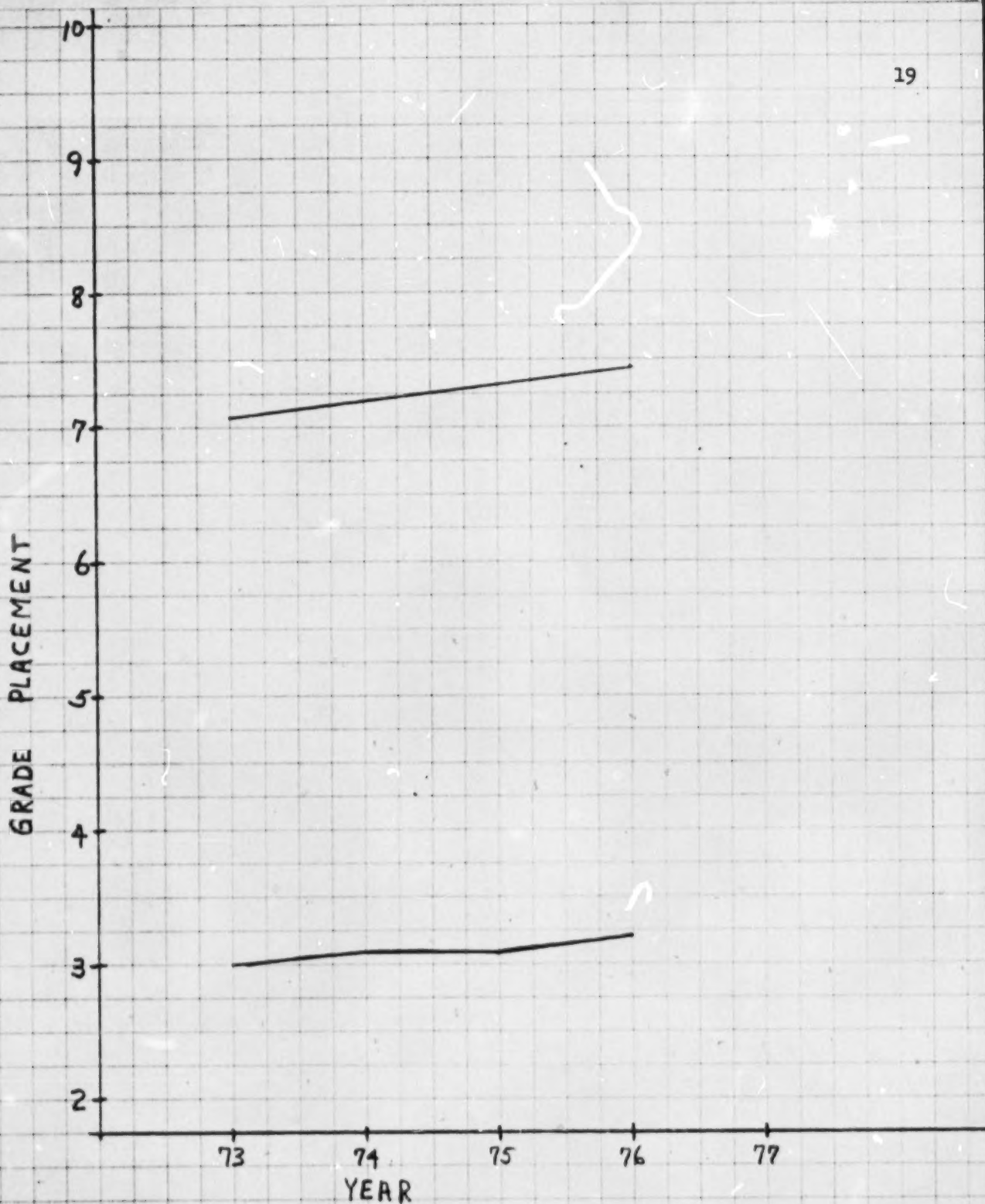


FIGURE 11

MEAN GRADE PLACEMENT SCORES FOR
ARITH. TOTAL BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

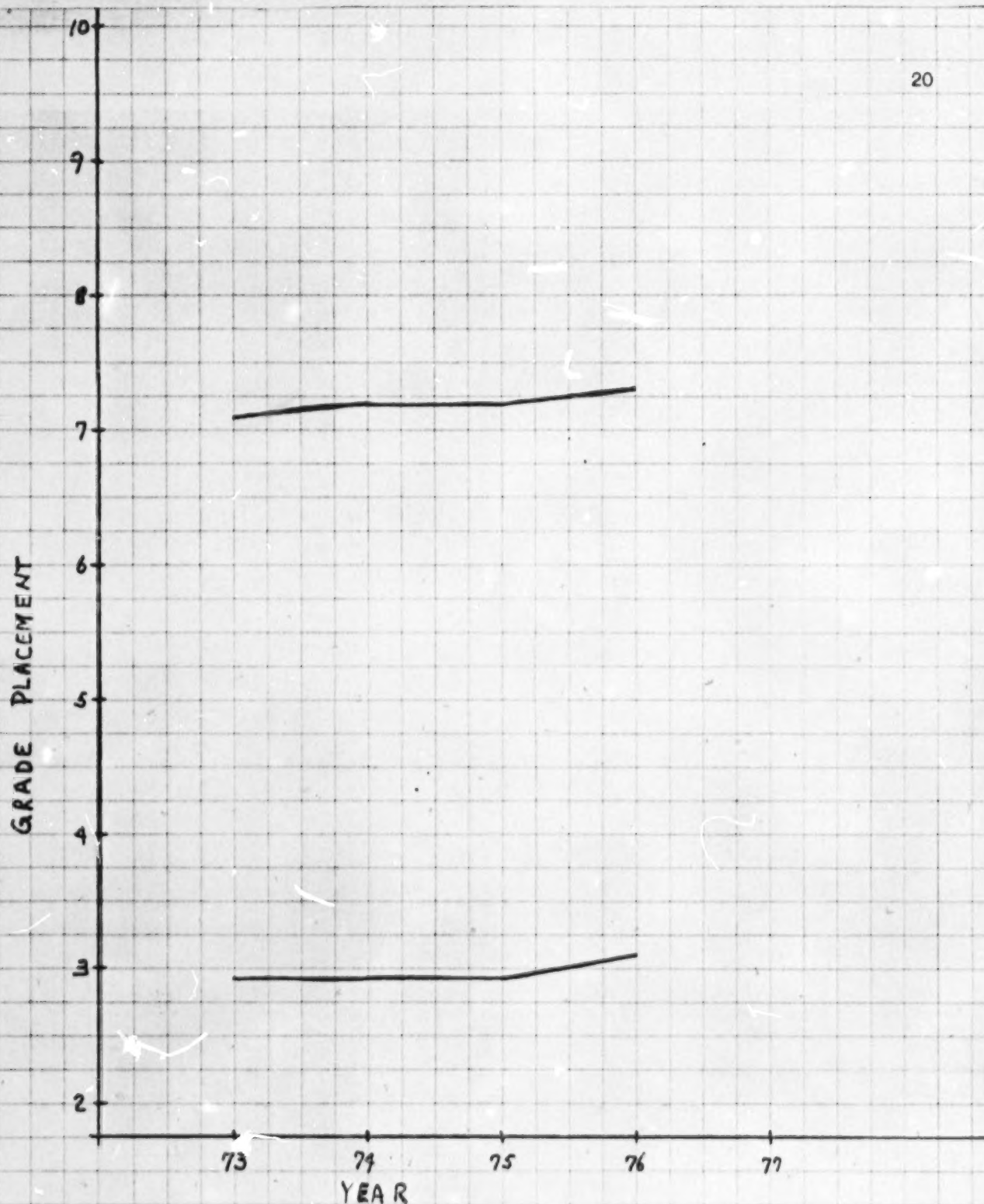


FIGURE 12

MEAN GRADE PLACEMENT SCORES FOR
BTRY TOTAL BY YEAR OF TESTING. PLOTTED
SEPARATELY FOR GRADES 3 AND 10.

SUMMARY

In summary we may conclude that the achievement of Indian children, as measured by the Comprehensive Test of Basic Skills, is higher in Robeson County in 1976 (after three years of the Indian Education Program) than it was in 1973 (the beginning of the Indian Education Program). This study supports the notion that Indian children are able to recover in achievement, from the many years of deprivation they have been exposed to. The study also points out that 10th grade Indian children in Robeson County are farther behind the national norms than their counterparts in the 3rd grade.

The current achievement data available for Robeson County may not be strong enough to support definite conclusions but it does suggest that the Indian Education Program is assisting with moving Indian children's achievement scores closer to the national norms. This suggests that if children from a poor environment receive enrichment like the Indian Education Program offers they seem to show a capacity for recovery.